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ORIGINAL ARTICLES

RICKETS AND TETANY IN INFANCY.*

By W. T. Buffum, Jr., M.D.
Providence, R. I.

Rickets is a disease characterized by softening and deformities in the bony structure, malnutrition, anemia, and weakness of the voluntary and involuntary muscles. This produces temporarily a condition of debility which seriously interferes with development and resistance to intercurrent disease. When recovery takes place, there are likely to be serious deformities unless proper orthopedic and medical treatment has been instituted.

Rickets may begin as early as the third month of life, and it ordinarily begins during the first year. The exact causes of this condition are still obscure, but on the other hand we know in a general way under what conditions the disease develops.

The factors of most importance are included in diet and digestion. Rickets is common following indigestion, with failure to gain in weight in feeding cases. Rickets is more common among the artificially fed than among the breast-fed babies and one would assume that this is chiefly because indigestion is more common among the bottle-fed.

Rickets is not uncommon among breast-fed babies. This occurs sometimes when the mother has plenty of milk and the baby shows no signs of indigestion. It has been suggested that this may be due to a decrease in the mineral content of the mother's milk caused by a diet deficient in fruits and vegetables.

As regards bottle feeding, there has been a feeling that rickets is more common among infants fed on cooked milk than among those fed on raw milk mixtures. This is probably true. It is certainly true that rickets is common among babies fed on proprietary foods. The proprietary foods, in addition to being cooked and dried, also give a poorly balanced ration, high in carbohydrate and usually very low in fat and protein.

*Read before the Rhode Medical Society June 1, 1922.

I do not believe that it is usually advisable to feed babies on raw milk in Rhode Island. Tuberculosis is prevalent among the cattle here. A few herds only have been certified by the Federal government as being free from tuberculosis, and except for milk which comes from these herds, I believe that milk fed to babies should be pasteurized or sterilized.

The tendency of this milk to produce rickets, if there is any such tendency, can be easily eliminated by the addition of small amounts of cod liver oil to the diet when necessary.

Second only to the diet in importance in the etiology of rickets is sunlight. Under ordinary circumstances rickets does not occur if the exposure to sunlight is adequate. Active rickets is found chiefly in February, March and April, following the months when there is the least sunlight and when the weather conditions make outdoor airings difficult. In May and June there is some tendency for the rickets to heal even if the baby is out of doors very little.

In certain country communities where the children are out of doors constantly, rickets is hardly found, while in nearby cities it is very common. It has been demonstrated recently that exposing babies to the direct rays of the sun causes rapid healing of existing rickets.

Experimental work on rats by Powers, Park and others was recently performed as follows: Rats were placed on a diet which under ordinary conditions produces a condition identical in its main features with rickets as seen in human beings. This diet is low in phosphorus and has an insufficient supply of fat soluble "A" vitamine. Eighteen of these rats were exposed to sunlight for an average of four hours a day for two months. They did not develop rickets. Six control rats kept under conditions of ordinary room light developed rickets.

The first sign of rickets when it appears in early infancy is generally craniotabes. This consists in a thinning of the parietal bones. It is recognized by the yielding and crackling of these bones when pressed on firmly. By watching for this, rickets

can be noted at an early stage and can be promptly arrested.

Beading of the ribs, forming the so-called rosary, is also an early sign. Later appear the square head with enlarged fontanelle, and the general enlargement of the epiphyses of the long bones, especially noticeable at the wrists. The deformities may appear early, the most noticeable being the bending of the tibiae. These produce the exaggerated forms when the infant begins to walk before the rickets is healed and the bones hardened.

Equally important with the bony condition is the general debility and impaired health of the whole organism. The voluntary muscles become flabby, adding to the deformity of the trunk. The digestive tract functions poorly, causing indigestion and constipation. The resistance to infections is lowered, with resultant chronic infections in the nasopharynx and also an increased mortality during acute infections.

In uncomplicated rickets the prognosis is good. There may, however, be a background of indigestion or chronic infection which makes the outlook less bright. A severe intercurrent infection such as pneumonia is always to be dreaded while the rickets is active. The degree of deformity which will remain depends on the individual case and on the length of time elapsed before appropriate treatment is commenced.

Recent experimental work by Howland and Kramer has shown that in infants with rickets the *calcium* of the blood is approximately normal, while the inorganic *phosphorus* of the blood is constantly diminished. That as the rickets heals, the phosphorus rises to normal, and as the rickets relapses the phosphorus is diminished definitely below the normal. Also, it has been demonstrated that feeding of phosphorus will increase the calcification of bone and arrest the rachitic process. Apparently the diminished amount of phosphorus in blood is closely connected with the fundamental cause of the disease.

The pathologic process which takes place in the bones is in general one of softening. At first there is vascularization of the epiphyseal lines and of the medulla. Then there is hyperplasia of the cartilage cells, defective calcification owing to the lack of deposition of lime salts, and the formation of osteoid tissue under the periosteum. In this stage there is an excess of organic bone material over inorganic material. Later, when calcification takes place, the contour of the bone is abnormal and may be much deformed.

The Treatment of Rickets.

In the first place, the child should be on a well rounded diet suitable to the age and digestion of the individual. It is important that any indigestion should be straightened out as soon as possible. Vegetables, fruits and meat should be given when the baby is able to take them.

The medicinal treatment consists chiefly in the administration of cod liver oil. Park and Howland have recently demonstrated on infants with rickets, that cod liver oil acts as a specific, and that after two or three months administration the rachitic bones become thoroughly calcified. It would seem reasonable to add phosphorus to the cod liver oil, as the phosphorus has been shown to be useful by itself, and this is commonly done in the form of oil of phosphorus.

Sunlight is a most powerful agent in the cure of rickets. Recently Hess and Unger treated five babies by exposing the skin to the direct rays of the sun for several hours a day. All the cases were markedly benefited and in one the healing process could be demonstrated by the X-ray 13 days after the beginning of treatment. An essential part of the treatment is evidently to keep the baby out of doors as much as possible during the hours of sunlight, and the direct rays of the sun on the skin are of benefit.

Tetany in Infancy.

Tetany is a disease closely related to rickets and generally associated with rickets. It is characterized by convulsions, spasms of the larynx, or contractions of the hands and feet, sometimes by a combination of these manifestations. It is the most frequent cause of convulsions during the late winter and spring and is nearly always the cause if there are as many as four or five convulsions in one day. It is also a common cause of irritability and failure to gain in weight.

The *etiology* of tetany is obscure. It occurs chiefly in association with the milder degrees of rickets, but is occasionally seen when there are no signs of rickets. From the frequency of the occurrence of rickets and tetany together, it is probable that the causes of the two conditions are sim-

ilar. Tetany is most commonly seen at from four months to one year of age, but is not uncommon during the second and third years.

The active manifestations appear almost exclusively during February, March and April, the same months during which active rickets is seen. The occurrence of these symptoms during the late winter and early spring is probably due to the slight exposure to sunlight during the winter, as it has been shown that the sun's rays will cure tetany.

Diet is evidently a factor in producing this condition. Tetany is comparatively rare among the breast-fed. It is not uncommon among babies fed on raw cow's milk and it is undoubtedly most common among those fed on pasteurized milk, dried milk and the proprietary foods.

Acute infections will bring on violent manifestations in a case that has been latent. The pain of teething also may produce active symptoms. Convulsions occurring during teething are usually due to tetany.

The three most striking symptoms of tetany are convulsions, spasm of the larynx and contractions of the hands and feet.

The convulsions may occur spontaneously, without any obvious exciting cause. More often they appear during teething or some mild infection. They are apt to be of rather short duration and to recur frequently. A history of recurrent convulsions, sometimes as many as ten in one day, is almost pathonomic of this condition. Constipation favors the recurrence of convulsions.

The spasm of the larynx, known as laryngismus stridulus, is less common but is very striking when it occurs. The baby begins to cry and suddenly his breath is shut off. He becomes cyanotic and sometimes intensely so. Then his larynx relaxes slowly and he begins to breath with a loud, high pitched crowing sound. This may recur many times during the day and cause considerable lowering of vitality.

The carpopedal spasms form the condition which was originally called tetany. The feet are held in a position of inversion and plantar flexion. The hands are rotated inward and flexed, with the fingers extended.

A constant feature of tetany is the restlessness and irritability of the baby. He is more or less fretful and fussy and if the condition is at all marked it is obvious that he is not well.

In addition to these manifestations there are certain diagnostic signs.

Choostek's sign consists in a twitching of the upper eyelid when the upper branch of facial nerve is struck with a finger or percussion hammer; or the twitching of the corner of the month when the lower branch is struck. In older children this sign may occur without having much significance, but with children under two years of age it only occurs in tetany.

Trousseau's sign is the contraction of the hand into the tetany position, when the blood vessels of the arm are constricted. This sign, if found, is supposed to be proof positive of the disease, but unfortunately it is difficult or impossible to obtain in most cases.

The galvanic current now furnishes us with the best diagnostic test. The current is passed through the body of the patient, one electrode being in contact with the skin at the head of the fibula and over the peroneal nerve, and the other electrode with the skin of the abdomen. If the *cathodal* electrode is over the peroneal nerve, it is noted that a current of two milliamperes, or less with calise, as the circuit is closed, a contraction of the peroneal group of muscles which flex the foot dorsally. This reaction with such a small current is very suggestive of tetany.

If the anodal electrode is in contact with the skin near the personal nerve, it is noted that a greater current is needed to cause a contraction when the circuit is closed than when it is opened. This occurs only in tetany in early infancy and is very suggestive even in older children.

Recent experimental work has shown that in tetany there is a diminished amount of calcium in the blood, in contradistinction to rickets, in which it is the phosphorus which is diminished. Other experiments have shown that in animals after removing the *parathyroids,* the calcium in the blood is diminished and tetany appears, and that after intravenous administration of calcium the tetany is temporarily relieved. Considerable work has been done which seems to indicate that the neuromuscular irritability in this condition is directly due to the diminished calcium in the blood.

The prognosis in tetany is excellent if there is no serious disease coexistent.

The treatment of tetany, in addition to the general hygienic measures suggested for rickets, consists in certain specific medication. The condition is relieved very rapidly by the administration either of cod liver oil with phosphorus, or of calcium chloride. With either treatment relief is to be expected within 24 hours.

If the symptoms are active, sedatives must be given to ensure against the possibility of some serious accident before this relief is obtained. Magnesium sulphate hypodermically or bromides by mouth are the agents of choice.

Rickets and tetany are both common diseases and their recognition and treatment in early infancy is of considerable importance.

SOME ASPECTS OF THE TREATMENT OF DIABETES.*

By Alex. M. Burgess, M.D.
Providence, R. I.

There are several reasons why a knowledge of the treatment of diabetes is of more importance to the family practitioner today than it ever was before. To begin with, diabetes is a disease which usually lasts for years and but a small proportion of diabetics can keep in touch with those specialists who are making the study of the disease their main interest. Furthermore, it is estimated that the general adoption of the newer methods of treatment of diabetes has increased the average life of the diabetic nearly forty per cent. In the meantime but little has been done that will be likely to decrease the occurrence of diabetes. The prevention of obesity, as Joslin has pointed out, may, as the years go on, prevent the development of many cases of the disease but it is extremely unlikely that this timely warning will have any appreciable effect in the near future. If there are, as is estimated, a million diabetics in the country today and their expectation of life has been increased forty per cent. while the development of new cases continues as before, it is self-evident that the number of live people suffering from diabetes and needing care will be much greater than it was before the span of life of the diabetic was lengthened. Another reason why every general practitioner should be familiar with the modern methods of treatment of diabetes is because so much more can be done now in the way of guiding the patient safely by those pitfalls which must ever lie in his way even when he has been successfully treated and is carrying on his daily life normally and living well within the limits of his tolerance. For example, a young man who has been under the care of a specialist in a large city has done very well and having been duly instructed in all that pertains to the ordering of his diet and daily life is allowed to go back to his home town and to resume his business. All goes well until he suddenly develops acute appendicitis, or measles, or perhaps acquires a severely septic finger, or breaks a leg. The responsibility for his care must now be taken by the family doctor at just the time when expert skill is most needed. The presence or absence of that skill may be the deciding factor in the outcome.

Granted, then, that the general practitioner must acquire a good working knowledge of the best methods of treating diabetes and its complications —it must be confessed that he is likely to find the road that he must travel rather rough and beset with many signboards pointing both ways. He will find that many of the questions which he will ask cannot be satisfactorily answered, and that those special workers in this field who must be his teachers are still far from perfect agreement in regard to many important points.

In addressing you today, it has seemed wise to me to lay especial emphasis upon those phases of the subject which appeal to me as being not only of especial importance but also veiled in a certain amount of obscurity if one attempts to elucidate them by means of a perusal of the current literature on the subject. I have chosen the following main topics for a discussion:

1. Routine treatment of the disease.
2. Types of diabetes.
3. The use of high-fat diets.
4. Acidosis. Certain points regarding its occurrence and treatment.
5. Surgical complications of diabetes.

1. Routine Treatment.

No one can deal with many cases of this disease without realizing the necessity for individualizing and not attempting to make a hard and fast set of rules which he can apply to all cases. Certain

*Read before the Providence Medical Association June 5, 1922.

principles, however, must be kept in mind. To begin with, the practitioner must have in mind the threefold object at which he is aiming—i. e., first, to extricate the patient from the difficulties in which he is found when first seen—that is to say, to rid him of hyperglycaemia and acidosis and any attendant symptoms; second, to determine for the patient a proper maintenance diet on which it is hoped he can live and carry on his affairs; last, and by no means least, to teach him what he must know to keep himself as far as possible out of danger. This last phase of the treatment involves not only instruction in simple dietetics and the urinary tests for sugar, but also specific warnings as to the danger of infections, operations and accidents, and a definite attempt to persuade the patient to keep himself permanently under some degree of observation by reporting at stated intervals for examination and a test of the fasting blood sugar. In rendering the patient sugar-free, various methods are applicable. In mild diabetes a few days of simple reduction in the total carbohydrate intake, with a slight lowering of the total caloric value of the food to just below the energy requirement, may be sufficient, or a complete fast of thirty-six hours may be considered easier. In severe diabetes, on the other hand, or in diabetes complicated by infection, it must always be remembered that sudden changes in diet are dangerous. The endogenous factors of food supply, that is to say, the fat and protein of the patient's own body, must always be kept in mind, as Woodyatt has so clearly pointed out. It is certainly advisable to try feeding a high proportion of fat to certain thin patients who have severe diabetes in order to spare their own body protein, if this is done in such a way that their total utilizable carbohydrate which is available for metabolism is not less than two-thirds the intake of fatty acids. In estimating the total available carbohydrates, as Woodyatt recommends, one adds to the carbohydrates as ordinarily reckoned, 58% of the protein and 10% of the fat, and considers 90% of the fats as fatty acids. For the great majority of patients, however, a simple method of gradual dietary reduction by a series of test diets, such as those used by Joslin, is convenient, safe and efficient. In these, the amounts of carbohydrates and protein are gradually reduced from day to day, while the fat is early eliminated and, if the patient is not sugar-free at the end of the fifth day, he is put on one day of fasting. I shall refer to methods of determining proper maintenance diets under the discussion of the use of high fat diets and acidosis.

2. Types of Diabetes.

From what has already been said it is clear, however, that a scheme of test diets, such as that just mentioned, should not be applied indiscriminately to all cases, nor was it so intended by its author. It is especially applicable to the average fat diabetic, and, as Joslin has pointed out, the average diabetic is, or has been, fat. This leads us to a consideration of the different types of diabetes.

Recently Wilder has discussed the probability that diabetes, like nephritis, is the result of various types of lesions, and he has classified 298 cases observed at the Mayo clinic into five groups with reference to possible differences in their etiology. Brigham has suggested a somewhat similar grouping. I have grouped according to the classification of Wilder the last fifty cases that have come under my observation in the out-patient clinic at the Rhode Island Hospital and the cases which have come under my observation in private practice since December 1, 1919, also fifty in number. (Table 1.) I have separated the cases occurring in children from the others under Type 1, because only one of them is to be considered true acute diabetes and has progressed to a fatal outcome in coma, while three of the others are mild, and one is apparently of the true renal type. A large proportion of those patients classed under Type 2 have shown marked obesity as well as evidence of vascular lesions.

Table 1.

	Types (Wilder's Classification).				
	1.	2.	3.	4.	5.
R. I. Hospital...	4 (Children*)	12	21	0	13
Private Records.	11 (Children 3)	12	18	0	9
Total (100 Cases)	15	24	39	0	22
Wilder's Cases (298)	19%	30%	15%	18%	18%

*One "renal diabetes."

Explanation of Wilder's Classification.

Type 1.—"Acute" diabetes—abrupt onset, usually progressive, lowering in tolerance. Most often seen in young people.

Type 2.—Vascular diabetes. Associated with hypertension or arterio-sclerosis.

Type 3.—Diabetes of obesity. Not associated with vascular changes.

Type 4.—Interstitial pancreatitis. Usually associated with disease of biliary tract.

Type 5.—Persistent Glycosuria, unclassified.

3. The Use of Fat in the Diet.

The relation of obesity to diabetes appears definite. Joslin, in a recent publication, quotes Mr. Mead of the Lincoln National Life Insurance Company as demonstrating that diabetes increases with age only as obesity increases and that it occurs to about the same degree in thin people, both old and young. Thus the problem of treating diabetics who are fat must differ from that of treating those who are thin. In both the principle of undernutrition, so well established by the work of Allen, must be the mainstay. In the fat, the obesity must be reduced, and if that is done early the battle against the diabetes is already half won. The use of fat in such patients is usually unwise, as their endogenous fat supply is large, must be reduced and will be active in sparing their body protein during the period of desugarization. The permanent improvement in tolerance that goes with the elimination of obesity is often very striking. I have recently had under my observation two patients who illustrate this point in a very striking manner. Both had been distinctly obese, one rather extremely so, and both had suffered for years from diabetes of rather a mild type. With extreme loss of weight, due in one case to malignancy and in the other to progressive arteriosclerosis with mild senile dementia, the tolerance of both was increased to such a degree that cane sugar could be taken without the appearance of sugar in the urine. Both were markedly arteriosclerotic. The second of these patients, following the excessive loss of weight, developed a strangulated inguinal hernia and was operated on under ether anesthesia without the appearance of sugar, acetone or diacetic acid in the urine. He has been sugar-free for the past two years.

In dealing with the obese, then, the plan should be to remove the obesity. When, on the other hand, we deal with those who are already undernourished, our aim should be to give them food sufficient for their protein and energy requirements, if possible, and to prevent the undernutrition from becoming too pronounced, and still to maintain them in a condition of moderate undernutrition. Maintenance diets which contain a high percentage of fat may be necessitated by the low tolerance of the patient for carbohydrate in order to fulfill his energy requirement, but it is probably well to feed him as much carbohydrate as his tolerance will allow. Joslin suggests that the use of a diet in which carbohydrate is unnecessarily low and the fat is correspondingly high is likely to result in the fixation of the patient's tolerance at a lower point than it would otherwise reach. Hypernutrition must in all instances be avoided. Leclercq, working with Allen, has recently demonstrated that hyperglycaemia is produced by adding excessive calories to the diet in the form of either fat or alcohol, and without increasing the intake of carbohydrate.

The use of fat in case of thin patients while desugarization is being carried out, in order to spare protein catabolism and allow of a greater reduction in the carbohydrate that is actually being utilized, is a measure the logic and practicability of which has clearly been demonstrated by the work of Woodyatt and of Newburgh and Marsh. The best general statement we can make regarding the use of fat is that the work of these men has shown that it is possible to use it in many patients with safety and advantage, so long as the total calories of the diet are still kept low enough to achieve the required degree of under-nutrition.

4. Acidosis.

There are several facts regarding the acidosis of diabetes which will bear emphasis. Much has been said recently about the exact proportion of carbohydrates to fats in the diet which theoretically ought to prevent the formation of keytone bodies from the fats and proteins in uncomplicated diabetes. The 1 to 1.5 ratio for glucose from all sources to fatty acids, as worked out by Woodyatt, is undoubtedly correct, for diabetes in the absence of complicating conditions. We must, however, remember that the conditions which favor the development of acidosis in the diabetic are many of them still unexplainable on the basis of the amounts and kinds of nutritive material available for metabolism. For example, infection of all sorts seems invariably to favor the production of acidosis, where it is a general toxaemia or an apparently localized process. The prompt disappearance of acidosis following proper surgical treatment is often very striking. I recently had

under observation a patient who, while living well within her tolerance, which was moderately high, suffered from an almost afebrile, mild attack of mumps. During the entire period of the disease, which lasted about eight days, diacetic acid was constantly present in the urine, and it promptly disappeared after the symptoms cleared. It is possible that increased protein catabolism is the cause of the ketonuria in these cases.

Another point which must be remembered is that *severe or fatal* acidosis may occur in *mild* diabetes. Thus intercurrent disease, infection, operation and, above all, other anesthesia are especially dangerous. I saw a patient recently who had undergone a long operation with ether anesthesia. Urinalysis both before and also the day after the operation showed the absence of sugar. Nevertheless, on the fifth day he died in coma. It was discovered that he had had a mild diabetes for ten years, a fact which for some reason he always wished to keep concealed and had been unwilling to tell his surgeon. The mild diabetic must be particularly warned and must be carefully treated when he becomes the subject of infectious disease or when operation is necessary.

I shall not enter upon a complete discussion of the treatment of acidosis and impending coma. The general principles involve keeping fat from the diet, keeping proteins low and feeding up to or even at times beyond the limit of carbohydrate tolerance. In case of impending coma the use of orange juice and oatmeal gruel, to supply the carbohydrate, with an excessive amount of fluid—as Joslin insists—at least a liter every six hours in any way that it can be retained, by mouth or by rectum, subcutaneously or intravenously, is appropriate. The reasons for not using alkalis are well stated by Joslin in his most recent publication on the subject. On the basis of my own experience, as far as it goes, I believe that alkalis should not be given. Joslin's statement that he has seen acidosis persist and progress to fatal coma when the urine had been rendered alkaline by the use of bicarbonate of soda, is convincing.

5. Surgery in Diabetes.

In dealing with conditions in diabetics which demand surgery, two courses may be followed, namely, either the diabetes may be disregarded and the surgery performed forthwith as indicated, or, unless the surgical indication is extremely urgent, the patient may be prepared by diet with the idea of eliminating hyperglycaemia and acidosis, and the surgery then undertaken when it is supposed that the patient is better able to stand it. This latter method has been used quite generally, but Joslin condemns it on the ground that the diabetic condition cannot ordinarily be successfully improved in the presence of a surgical complication and that the chances for the patient are much better if the surgery is done as soon as possible and the patient then consigned to the care of the medical man to do what he can with what there is left. In his recent excellent article on "The Treatment of Threatened and Real Gangrene in Diabetes," on the other hand, Bernheim recommends careful medical preparation for surgical procedures. Two cases that have occurred in my own practice stand out prominently in my mind. One was an old man on whom Dr. Matteson performed a much-needed prostatectomy and another a young woman on whom Dr. Porter did a Caesarian Section, also much needed. Both patients died. Both died without showing a trace of diabetic acidosis. Needless to say, the surgery in both instances was performed with the utmost skill. I cannot escape from the impression that the under-nutrition which was necessary in correcting the diabetes reduced the resistance of these patients to such a degree that it became the main factor in bringing about the fatal issue. I believe that surgery which cannot be delayed indefinitely should be done at once, and that a careful but limited period of preparation is liable to leave the patient a worse operative risk than he was before it began.

The foregoing is an incomplete and fragmentary attempt to bring to your attention some of the interesting phases of the treatment of diabetes. Every year sees new advances in the field, and with the increased interest in the subject and the new facts which are constantly coming to light, the future of this work may, and, we may hope, will be extremely bright.

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N. DARRELL HARVEY	*President*	Providence
P. P. CHASE	*Secretary*	Providence

WASHINGTON

Meets the second Thursday in January, April, July and October

ASA S. BRIGGS	*President*	Ashaway
WM. A. HILLARD	*Secretary*	Westerly

WOONSOCKET

Meets the second Thursday in each month excepting July and August

EDGAR F. HAMLIN	*President*	Slatersville
A. H. MONTY	*Secretary*	Woonsocket

Section on Medicine—4th Tuesday in each month, Dr. Charles A. McDonald, Chairman; Dr. C. W. Skelton, Secretary and Treasurer.

R. I. Ophthalmological and Otological Society—2d Thursday—October, December, February, April and Annual at call of President Dr. C. J. Astle, President; Dr. J. L. Dowling, Secretary-Treasurer.

The R. I. Medico-Legal Society—4th Thursday—January, April, July and October. Dr. James P. Littlefield, President; Dr. Jacob S. Kelley, Secretary-Treasurer.

EDITORIALS

THE PROFESSION AND THE PUBLIC.

Two recent addresses by recognized leaders of the medical profession are most significant in showing the relation that should exist between the profession and the public.

Dr. George E. deSchweinitz, in his speech of acceptance of the presidency of the American Medical Association, stated that a "transition from individual to organized practice already has begun," intimating that the attitude of many physicians in attempting to maintain the strictly private relation of physician and patient, and in wishing to abolish the community hospitals and health centers, was not the true attitude of the progressive physician. As he says: "The public is not satisfied with a service that is devoted only to the cure of maladies and the mending of injuries, but is very much alive to the advantages of the prevention of disease and the conservation of health."

In an address before the California State Medical Society on "Medical Education of the Present and Near Future," Dr. Ray Lyman Wilbur, Pres-

ident-elect of the American Medical Association, has some interesting things to say about the relation of the physician to the public. He believes that preventive medicine has changed the attitude of the practitioner to his patient and the community. Formerly the physician treated the patient only, but now "he must remember that the sick man is a social unit." It is necessary "to establish proper relations of the sick individual to the community." It is as important for a sick man out of a job to obtain "light work and mental repose as well as a diet and nitroglycerin for his high blood pressure." To be able to give this service to the community, there are new forces that should be used in the proper way. These forces are here to stay and are represented by the trained nurse, the dietitian, the laboratory workers and the social service workers. These forces have been accepted by the public and the physician should learn to use them in a co-operative way, always maintaining his own leadership. If he attempts to oppose these forces when properly used and directed, then he will tend to diminish the respect on the part of the public for the medical profession.

THE CHIROPRACTOR.

The irregular cults have always claimed a certain portion of the population as their legitimate prey and this fact has been recognized from the earliest dawn of history. With every succeeding generation the irregular practitioners become more successful in their methods. It is interesting to note that the chiropractor has taken advantage of one of the greatest aids to medical practice, the X-ray, only to use it in a pseudo-scientific manner which does impress certain patients, but must react in the end to his own disadvantage. Chiropractors are now in the habit of sending their patients for X-ray examinations of the spine, but they will permit no interpretation of these plates except by themselves. Any little irregularity in alignment due to the position in which the patient is lying when the picture is made or due to a tilt in the tube, is pounced upon as an indication that the spine is out of plumb. This method of examination impresses the average intelligent person as being scientific, unless he thinks deeply in the matter or has his attention called to it by some physician familiar with the physics of the X-ray. This means that considerable harm is being done and considerable money is needlessly taken from patients, many of whom can ill afford it.

Another interesting development is the fact that many osteopaths have found that they cannot depend entirely upon manipulation for the cure of certain back conditions, but are using adhesive plaster strapping and belts, as do their confreres of the regular school. We believe that the tide has begun to turn. These practitioners have over-shot the mark and there is a feeling which, we believe, will become stronger in time, that their activities should be limited. We venture to predict that in another generation their numbers will be greatly diminished and that the good they have accomplished will be taken into the regular school. In the meantime, we should not relax our vigilance, but should oppose with all our force, the further practice of these cults unless they can pass the examinations in the fundamental sciences of medicine which are required of all of us before we are allowed to practice upon the public.

IS THE DOCTOR A GOOD CITIZEN?

Very few people today stand out prominently as possessed of either superior intelligence or education. It has been said that to "know something of everything constitutes intelligence and to know something of everything is skill." Years agone, the physician was accorded the reputation of knowing nearly everything having to do with the treatment of diseased conditions to which the human flesh is heir; incidentally, he was not infrequently called upon to advise in matters that were remote in thought from his field of professional activities. The eligibility of prospective swains; the investment of money; the transfer of property. He wrote wills and acted as administrator of estates; he was considered to be not only an intelligent man but altogether an educated man; one whose opinion was sought after and respected.

With the progress of recent years, however, education has become not only general but common, and people began gradually to ignore him; when troubled with the toothache, the dentist was sought, and the lawyer for legal advice; willy-nilly, he has been crowded (and properly) into his own sphere of work; today he is a cog in the wheel, important even as the plumber is important —in case of accident. And still by some atavistic psychology, he clings to the graceless heritage of

exclusive superiority, failing to realize that he is first a man, then a citizen, and finally a physician, which last is only a chosen field of work.

Common expectancy is that as a man he shall be upright and honorable and as a physician he shall at least be ordinarily skilled, and taken all-in-all, he is usually able to respond "present" to both.

Notwithstanding that he often gives of his time to the needy and as circumstances permit, money to charity, in the progress of modern affairs he is not abreast of his responsibilities as a citizen; his attitude toward society and the community is that of a non-producer, holds himself aloof from the participation in the forming of laws and rules that govern him, but whines if they offend him or circumscribe his activities or supposed prerogatives. Opportunities for both civic and professional betterment are open if physicians will act together. Never in history has cohesiveness and unity in our welfare, not only in regard to professional affairs, but in good citizenship, been more essential or necessary than now.

Present chaotic conditions in our particular walk of life have not been forced upon us, they have been invited; pains and pills are entirely within our province but hardly less imperative is a sober contemplation as to what destiny shall preside over our activities and rights.

It is the duty of every physician to hold steadfast to good citizenship and to speak and act the right as he sees it, in civic as well as professional concerns, unbiased by "cliques" or partisanship.

To be a man essentially of the community.

ORAL SEPSIS.

A Discussion of the Subject Before the Providence Medical Association

June 1, 1922.

By Frank E. Peckham, M.D.

Oral sepsis may be considered from more than one viewpoint. As this program is apparently planned to bring out some of these different viewpoints, it would seem that it practically amounts to an experience meeting. Consequently, the subject will be presented in this way and such proof offered as seems best suited to the conditions.

By oral sepsis is meant septic or infectious conditions, acute or chronic, involving the mouth or throat, even extending up into the ear. Right at the very beginning, let us remember that this part of the anatomy, along with its local physiological processes, is not a separate entity but is only a very small although very important part of the whole economy. The whole physiological machine must be kept in mind, also the fact that there are many intricate parts and that they are all interdependent. One part getting out of order starts a vicious circle which may ultimately extend throughout the whole mechanism.

We have been through an era of reckless teeth extracting and we are still in an era of reckless removal of tonsils. In the vast majority of cases of arthritis the toxines are present because of the faulty function of some of the abdominal organs. The liver, for example, is probably the most important detoxicating organ in the body. It is an especially large organ and when no trouble exists, is extremely efficient. If it becomes clogged or its cells damaged, its function is interfered with and poison from the intestines is absorbed into the system in varying quantities. The tissues of the mouth, throat and surrounding areas are for some reason very susceptible and absorb these poisons readily. The result is that adenoid tissue forms, tonsils become enlarged with, at times, more or less active infection. The point for treatment to attack here is, always, the abdominal organs. This does not mean that the teeth and tonsils and running ears do not need attention. They do, but they do not always need surgical attention. Indeed, with a more intimate knowledge of physiology they are needing it less and less, and when the physiological principles become more generally recognized, the surgery of these parts will be reduced to its minimum.

As far as teeth are concerned, some years ago it was not uncommon for patients presenting with arthritis, to state that they had been advised to have all teeth extracted as the first thing to do. The people rebelled at this and practically compelled a cessation of such malpractice. At the present time careful X-rays are taken to ascertain which teeth should be removed. Now as regards the benefits of such extractions in arthritis. As indicated above, the factory where toxines are made is usually in the abdominal organs. The infection at the apices of teeth and the surrounding tissues, to my mind, is a reservoir rather than the original source. The facts which make me feel this way are repeated so frequently that they are

very convincing. Patient after patient comes in with the story that either certain teeth or all teeth were extracted with either some relief or with so great relief that it was considered a cure. Then after a shorter or longer time the symptoms returned until the patient was just as bad if not worse than ever. This is a very common story.

It does happen, however, that arthritis has been cured by the extraction of teeth. Also I have known of one or two cases of infection where failure to have teeth extracted might very well explain the death which followed.

Regarding tonsils, it makes a difference whether the patient is an adult or a child. In children with enlarged tonsils and adenoids, the majority of those I personally see, are deficient in calcium. The direct result of this is a loss of tone of all tissues, including all muscle tissue. This loss of muscle tone results in the faulty postures which are so common in children. Lymphoid tissues enlarge and hence the tonsils and adenoids. The musculature of the intestines is involved just as all muscle tissue in the body, hence faulty assimilation. With all tissues and physiological processes below par and toxines playing fast and loose through the system, the lymphoid tissues become very susceptible. This same calcium deficiency also explains the fact that about 90% of all school children have defective teeth. Of the more than 200,000 operations for tonsils and adenoids per year in the United States, from my very limited experience it begins to look as if many of them were unnecessary. If the calcium is replaced and its assimilation into the system assured, these tonsils will return to normal and throat disturbances cease. In a recent case where the parents had been told that a pair of large tonsils would never disappear unless removed surgically, the throat is now normal and the colds and attacks of tonsilitis have completely vanished. In some cases such disappearance may be hastened by X-ray or diathermy but in the majority of cases it would not seem to be necessary.

The enlarged tonsils of adult life is a different story. In the arthritis cases it is not uncommon to see the tonsils gradually diminish in size as improvement is obtained under treatment. The treatment consists of stimulating the various organs to do their work properly. The liver and spleen and intestines are important organs. When the function of the liver is restored, detoxication again takes place. When the function of the intestines is restored, assimilation again takes place and this explains why tonsils shrink and cease to be reservoirs and in adults no longer need surgical attention. These results are all obtained by the various physiotherapeutic and dietetic measures. In adults, as in children, in resistant cases X-ray and diathermy are valuable methods of treatment In tonsils, as in teeth, cases may need surgical attention, but here also the non-surgical results obtained in a limited experience are so encouraging as to warrant a continuance of the methods.

Protein Poisoning.

There are certain proteins which, when introduced into the system, affect the serous and mucous membranes. This was first brought to our attention in connection with joints. For example, a hip joint will become tender and the child will begin to limp. Slowly the leg will be drawn up by muscular contraction. The same condition may exist in the knee or ankle or any other joint. Although these proteins may come from the ingestion of almost anything, depending upon the idiosyncrasy of the patient, yet in my experience they usually come from the ingestion of some kind of meat. By putting the child upon a meat-free diet the symptoms promptly disappear. Then by trying one kind of meat after another it is easy to establish the particular kind. As the child grows older and acquires greater resistance, the particular sensitiveness is usually overcome. The same thing may happen with regard to the mucous membranes of the mouth and throat.

A baby of one of our own members offers a striking example. When the baby was three and one-half months old, the right ear began to discharge. The ear was washed out for four months without any effect on the discharge. At this time the naso-pharynx was curetted for supposed adenoid tissue.

Practically nothing was obtained. Immediately following this operation there was an acute inflammatory attack with a temperature of 103 to 105 and pulse of 140 to 150. There was also a profuse discharge from the nose, a laryngitis, an abscess of the opposite ear, double conjunctivitis, some keratitis, cervical adenitis on the same side as the original discharging ear, with abscess

formation. There was also a papular eczema of the face. The acute condition subsided after three or four weeks but the original ear continued to discharge one or two teaspoonfuls daily.

About a year from the onset there was a well marked improvement for a short time.

All this time the baby had been on a mixture using top cream. After the ear had been discharging one to two teaspoonfuls of pus for 20 months the baby's diet was changed to boiled skimmed milk. There was a sudden cessation of the discharge occurring inside of 48 hours. This improvement lasted for one month, when measles developed, and the original formula of top cream mixture resumed. Almost immediately the discharge began just as profuse as ever. After nine or ten days with the omission of cream and the use of skimmed milk the discharge promptly ceased. Quite some time later an attack of tonsilitis developed. On the omission of milk from the diet the tonsilitis promptly subsided.

It is easy to see that if acute poisoning will take place, as actually demonstrated in the above case, it is not difficult to believe that slow or chronic poisoning also takes place, resulting in a thickening of the tonsil tissue and a proliferation of adenoid tissue. With this visualization of the process, actual practice seems to be resulting in positive proof, in that, with proper treatment, these tissues return to a normal condition.

From my personal experience, therefore, it will be evident that my conclusions must be:

1. That in the majority of cases the pus collections in the apices of teeth and in tonsillar tissue are only reservoirs and not primary foci.

2. There are times when undoubtedly extraction of teeth and surgery of tonsils are imperative.

3. The studies as outlined above offer proof that there will be an increasing number of children whose tonsils and adenoids may be successfully taken care of without surgery. That there will be an increasing number of adults (suffering from arthritis) whose tonsils will slowly be restored to normal under the ordinary physiotherapeutic treatment for the arthritis with or without the aid of X-ray or diathermy.

CASE REPORT

Acute Exacerbation of a Chronic Nephritis With Uremia; Complicated With Fractured and Dislocated Cervical Vertebrae.*

Edward G. Melvin, M.D.

With the permission of Dr. Charles O. Cooke, I am presenting the following case, which was on the second surgical service of the R. I. Hospital, in order to show the advisability of on early examination of the eye grounds in any suspected case of nephritis.

Patient R. K., Brown student, age 20, entered hospital February 27, 1922, with the following story:

While wrestling, patient was thrown to the floor, landing heavily on the base of his spine. Following this fall, patient stood up, felt dazed, and toppled right over, neck feeling paralyzed. He remained dazed until he was sent into the hospital by Dr. Bugbee.

His chief complaint on entrance was weakness, inability to stand or to hold his head up.

Family history was essentially negative. Patient's past history: He had typhoid and diphtheria and an acute mastoid in childhood. Otherwise negative.

Physical examination: Head, negative. Eyes, react slightly. Nose, no obstruction. Throat, somewhat injected; tongue protrudes in midline and has a heavy light brown coat. Teeth, fair. Chest, heart and lungs negative. Abdomen, negative except for areas of parasthesia. Knee jerks normal on entrance.

Local: Marked tenderness over upper dorsal spine. Forearms and hands feel numb, pins and needles sensation. Right grip stronger than left. Sensation better over right neck than left. Better over right abdomen than left. Patient can move both arms and both legs. Right arm cannot be moved as accurately as left. Patient lies in a rather dazed condition, breathing rather loudly. Keeps

*Read before the Providence Medical Association April 24, 1922.

his eyes continuously closed and it is difficult for him to open them.

Progress: February 27, 1922. Patient acutely ill, seems dazed, breathes deeply; neck swollen, moves arms awkwardly, strength in hands unequal, speech seems thick, keeps eyes closed, and is annoyed when the lids are raised; is restless. Patient made comfortable for the night and X-ray pictures were ordered and taken in the morning with the following interpretation.

February 28. Examination of the dorsal and lumbar spine; also the cervical spine.

There is evidence of slight displacement of the third and fourth dorsal vertebrae. The spinous process of the third vertebra is out of alignment.

These findings are suggestive of fracture.

Further examination is desirable. Films of the cervical spine should also be taken.

Next day, patient began to show signs of nerve irritation, having involuntary movements of both arms and patient kept continually scratching and picking at his shoulders and upper arms; any attempt to move the head caused great pain. Examination of the reflexes showed them all to be hyperactive. Patient also had marked incontinence, both urinary and fecal, the first few days in the hospital.

Three days after entrance the left side of patient's neck began to swell, a hard swelling, and it was thought that it was a leakage of spinal fluid or blood. Patient's condition was very precarious and given up as hopeless. Portable X-ray pictures were taken and an attempt made to put neck on extension in order to relieve patient if possible.

March 2. X-rays of vertebral column show displacement of the third and fourth dorsal, and dislocation of fourth and fifth cervical vertebrae, fifth being displaced backward. The sixth cervical is crushed in upper portion. Urine shows a trace of albumen. Temperature subnormal, pulse full and bounding. Condition remains about the same. Moved to special room. Head of bed elevated and traction put on head by Dr. Cooke and Orthopedic Department. Seen by Neurological Department. Condition regarded as dangerous either with or without operation. Next morning patient was taken to the operating room and dislocation was reduced by Dr. Danforth and Cooke.

OPERATION.

Head of patient extended in straight line. Head then flexed sharply to left side, then rotated to right side. Vertebra then heard and felt to snap into place. Patient was then taken to X-ray on the Albee table and pictures taken and then a plaster cast was applied from top of his head to his hips.

March 3. Examination of the cervical spine showing fracture and dislocation in the region of the fourth and fifth cervical vertebrae after reduction. The position of the bone is markedly improved. The upper portion of the body of the fifth cervical vertebra is displaced slightly backward. The interspace between the fourth and fifth vertebrae is narrower than normal.

Following this procedure, patient did not seem to get any better and after further investigation it was found that patient had been seen by other physicians before the accident and that they were treating him for nephritis. Blood pressure was immediately taken and was found to be 230 Systolic and 140 Drastolic. Blood chemistry examination showed the following: Sugar, 18%; Van Slyke, 34%; creatinin, 10.4 mgm. per 100 c. c.; urea nitrogen, 78 mgm. per 100 c. c.

Next day 8 ounces blood withdrawn and 250 c. c. glucose given intravenously.

Patient seemed to be getting steadily worse and the Neurological Department and Ophthalmological Department asked to see patient and they rendered the following report:

March 4. Long history of nephritis with hypertension. Cord injury now.

(1.) Cord injury—power in legs is preserved and skin of legs sensitive to pain. For more delicate skin tests, patient is sluggish mentally and is not co-operative. Spinal fluid drainage probably of blood serum and spinal fluid might relieve some pressure on cord. Phrenic preserved probably, patient is incontinent, but has had bed wetting for some time.

(2.) Pupils are about equal. No evidence of pressure in cervical sympathetic excepting right lid lag.

The blood pressure is high, the red renal moderately low and trace of albumen in urine.

O. D. Disc is pale and outline blurred. Throughout the retina there are small hemorrhagic areas

and small areas of atrophy, one near macula as large as one-half disc. Finer vessels are tortuous and arterial contour of larger vesels is inconstant in many places.

O. S. Disc is pale and outline blurred, slight swelling of inferior border and below this area vessels are broken. Arterial accidents of recent origin and areas of atrophy of arterial origin of longer duration in this eye also—below macula there is a rather large area.

Opinion: Arterial sclerosis of long standing with many old and recent arterial accidents in retina. Recent hemorrhages and blurring of discs, mental signs and blood pressure in the absence of more evidence of cord injury make me believe that he has a cerebral oedema accompanying his old vascular condition brought to a head by accident and operation.

On March 5, 1922, another examination of the blood gave the following result: Van Slyke, 26%; 121 mgm. sugar; 11.4 mgm. Creatinine; 108. mgm. urea nitrogen; 207. mgm. N. P. N. Eight ounces of blood withdrawn and 250 c.c. glucose given with no ill effect.

Patient was very irrational and restless, seems to be in state of stupor. There is now marked swelling about right side of the face and generally condition is worse. Blood pressure at this time is 210 systolic and 80 drastolic. Seen by the Medical Service and chloral hydrate ordered to get patient quiet. Patient is not taking any nourishment, liquids have to be practically forced into him. Bowels are kept constantly open and high colon irrigations given every six hours.

March 8. Eight ounces more blood removed and glucose given intravenously, no ill effect following same.

Examination of blood still shows a marked retention of nitrogenous material.

March 8, 1922. Blood: 36 V.%, Van Slyke, 122 mgr. sugar per 100 c. c. of blood; 163 mgr. urea N. per 100 c. c. of blood; 11.4 mgr. creatinine per 100 c. c. of blood; 266 mgr. N. P. N. per 100 c. c. of blood.

March 9, 1922. Patient in a semi-comatose condition at all times, had three marked convulsions today and blood pressure is now at 180 systolic and 100 drastolic.

March 10, 1922. Condition very poor today and it is only a question of hours as to his end. Two convulsions today but not as marked as on previous occasion.

March 11. Temperature subnormal, respirations have fallen to as low as 12 per minute. Bowels moved. Patient is very restless, seems to have lack of control of movements. Is irrational, and seems to be semi-comatose at times. Had two convulsions. Is still incontinent. Breath smells markedly of acetone.

From this time on, patient grew worse and had several convulsions up to time of his death.

March 14. Blood pressure lower. Condition worse. More irrational. Blood chemistry shows an increase in nitrogenous blood products. Respirations increasing slightly in rate.

Blood examination day before his death showed the following:

March 14, 1922. Blood: 12.6 mgr. creatinine per 100 c. c. of blood; 216 mgr. urea N. per 100 c. c. of blood.

Early next morning, patient had a very violent convulsion and died, 16 days after admission to the hospital.

Death was attributed not to the injury in the cervical region, but to an acute exacerbation of a chronic nephritis and the ultimate uremia.

Case discussed by Dr. Charles O. Cooke, Dr. Charles McDonald, Dr. Berry.

SOCIETY MEETINGS

Rhode Island Medico-Legal Society.

Regular annual meeting of the R. I. Medico-Legal Society was held at Slocum's Pawtuxet Cove House, Thursday, June 29, at 5 P. M., President Roswell S. Wilcox in the chair.

No papers were read, and after the reports of officers the annual election was held and the following officers were elected: President, James P. Littlefield; Vice-President, Harry S. Flynn, M.D.; Secretary-Treasurer, Jacob S. Kelley, M.D.

The meeting showed the best attendance for several years.

After adjournment a shore dinner was served.

H. S. Flynn, *Secretary.*

Washington County Medical Society.

Quarterly meeting was held at "The Hummocks," Wickford, Thursday, July 13, at 11:45 A. M.

Dr. Lucius C. Kingman of Providence spoke on the subject, "Gall-Bladder Disease."

W. A. Hillard, M.D., *Secretary.*

BOOK REVIEW

"THE PLACE OF VERSION IN OBSTETRICS."

By Irving W. Potter, M.D., F.A.C.S.

Cloth, 138 pp. C. V. Mosby Co., St. Louis.

This book has been written with the intention of urging the employment of internal podalic version, according to the method evolved by the author.

The first chapter deals exhaustively with the early history of version, referring to and giving quotations from the writings of the fathers in medicine, from Hippocrates to William Hunter, i. e., to the opening of the nineteenth century. This chapter bears evidence of wide reading and research, and incidentally to an unusual access on the part of the author to the works of the early writers. It is by far the best epitomé of the writings of the first obstetrical authors which we have seen.

The second and third chapters recount the practice as regards version, of the nineteenth century, and of the present time, respectively, and are resumés of the opinions of the various teachers of the time.

The remainder—about one-half of the book—is devoted to the indications for and the method of version advocated by Potter.

He recommends version in all cases, no matter where the head may be. His argument is that maternal morbidity and mortality are lessened, that the maternal soft parts suffer less damage, that the second stage, with its long drawn out period of pain, is abolished, that the fetal mortality is in no wise increased, and finally that the method works a great saving of time and strength for the attending obstetrician.

This pronouncement from Potter, made about five years ago, has created much discussion and not a little opposition, but Potter is a good fighter, and opposition has only made him stronger in the courage of his conviction. Surely a man who performs over a thousand versions per year, as Potter has done for several years past, is entitled to a respectful hearing, and his opinions should have much weight.

With regard to the technique, he takes up the various steps of the procedure, seriatim, describing them at length, and illustrating them by a series of photographs of the operation, each photograph reproduced also in a schematic drawing. This form of illustration is new, and adds greatly to the value of the book.

It seems to the reviewer hardly fair to author or publisher to enlarge upon the narration of the technique. Suffice it to say that the book is of much interest, as introducing something really new in obstetrics, and should be read by everyone having especial interest in that branch of medicine. Whether or not the reader agrees with the author in all particulars, he cannot fail to improve his own method of version by studying that of Potter.

The work is written in an excellent literary style and flashes of humor now and then introduced add to the pleasure of the reader.

ETHER AND LAVENDER

Medical Practice Under the Law.

By Wm. R. White, M.D.

The Caller Speaks.

"Are you the Doctor? How d'ye do?
May I have just a word with you?
In half a minute I'll explain
Just why it was to you I came.

Now, Doctor, I have had a cold,
In fact, it's now some three weeks old.
I've tried my best to shake it off
But still I have to sneeze and cough.

I've taken quite a lot of things
But nothing satisfaction brings,
So while I try to keep along,
I do not feel so very strong.

It seems to me I've had enough
Of medicine and all such stuff.
I'm sure 'twill help me if I take
A drop to gently stimulate,

And give me stronger appetite
To brace me up this cold to fight.
I'm sure the sense of this you'll see
And on the whole concur with me.

A friend of mine with whom I live
Said he felt pretty sure you'd give
'Prescription,' that's the name, said he.
If so, you'll greatly favor me."

The Doctor Speaks.

"Young man, while I well know it's true
That I've no time to waste on you,
And that most nervy, also bold,
Are you to talk about a cold.

Please do not think me quite so thick
As to believe you're one bit sick.
Nor am I really quite a dunce,
For since you came you've not coughed once.

Just naturally, I must suppose,
You've quite forgot to blow your nose.
What's wrong with you, at very worst,
Is only tantalizing thirst.

And why you're here to me is clear,
Forbidden sale of lager beer,
The which if you could cheaply buy,
You'd never get so beastly dry.

Yet son, to me you do appeal,
For I know well just how you feel.
Hence I believe it's legal quite,
That I for you prescription write.

I'll write for whiskey ounces four,
A quarter pint, no darn drop more.
Drink all of it, just gulp it down,
'Twill help that thirst of yours to drown.

For fourteen hours you'll stay in bed,
To then get up with awful head.
But never mind how great your pain,
Don't ever come to me again.

It's evident you really think
You need what once was called 'a drink.'
It's best for you to change your mind
And on the water wagon climb.

If this advice you take from me,
A better man you'll surely be.
Remember, you have no disease.
Take that door out; two dollars, please."

ABSTRACT

CONGENITAL DISLOCATION OF THE HIP.

Henry Bascom Thomas, Chicago, reviews his results in the treatment of dislocated hips. In all, there were forty-four cases and fifty-six hips. Twenty of these cases, or twenty-six hips—the condition being bilateral in six cases—were those of patients six years of age or older. In this series, eighteen operations were done. Reduction was effected in five cases, in one of which the dislocation was bilateral. One hip was redislocated because of the development of trophic changes. Eleven hips (seven cases) were not treated because the prognosis was too unfavorable. One hip remained out, as attempts at manual reduction failed and the open method was not tried because the muscles were too tense. One hip is marginal. In another case the result is questionable. The results in seven cases are not yet known. In none of these cases was the machine or reducing table used. There were twenty-four cases of patients under six years of age. In six of these the dislocation was bilateral. Therefore, these cases included thirty hips. Forty operations were performed. Fifteen hips were reduced with a fair to good anatomic result and good function. The parents were pleased. Three hips remained unreduced and the patients did not return after release from the cast. In two cases the dislocation recurred. One of these patients has a fairly good function. In two cases the result is questionable. The results in six cases are not yet known because only the index card was found. In one case of bilateral dislocation the anatomic results are perfect and function is good, but the patient limps slightly when fatigued. The five cases in which the hip is still out, the two cases in which it is marginal, and the two cases in which the results are questionable should not be regarded as failures, perhaps, because as the patients are still under six years of age, the prospect of a successful result in another attempt at reduction is at least fair.

It is urged that all those who have had experience in the treatment of congenital dislocation of the hip make a detailed report, thus aiding in establishing standards of management which cannot fail to improve our results.—*Journal A. M. A.*, February 4, 1922.